

CLAIMS

1. An access router apparatus to control a subnet,
said apparatus comprising:

5 address information storing means for storing
address information usable in at least one adjacent
subnet arranged adjacent to said subnet controlled by the
apparatus itself;

address selecting means for selecting said address
10 information stored in said address information storing
means; and

address providing means for providing said address
information selected by said address selecting means to a
mobile terminal connected to said subnet controlled by
15 the apparatus itself.

2. The access router apparatus according to claim 1,
wherein there is provided address information updating
means for acquiring said address information from the
20 access router to control said adjacent subnet and for
storing said acquired address information to said address
information storing means.

3. The access router apparatus according to claim 1 or
25 2, wherein said address selecting means is designed to

select said address information to be provided to said mobile terminal in response to a request from said mobile terminal.

5 4. The access router apparatus according to claim 3,
wherein said address selecting means selects said address
information usable in said adjacent subnet at handover
destination of said mobile terminal according to
identification information related to said adjacent
10 subnet received from said mobile terminal.

5. The access router apparatus according to claim 1 or
2, wherein, in case said address information is provided
by said address providing means to said mobile terminal,
15 said address information provided by said address
providing means is deleted from said address information
stored in said address information storing means.

6. The access router apparatus according to claim 1 or
20 2, wherein said apparatus is provided with a function
relating to fast handover, and said address providing
means is designed to transmit FBack message or PrRtAdv
message including said address information selected by
said address selecting means to said mobile terminal.

7. A communication handover system, comprising a plurality of access router apparatuses, each controlling a subnet, said system further comprising:

address information storing means for storing an
5 address information usable in at least one adjacent
subnet arranged adjacent to said subnet controlled by the
apparatus itself, address selecting means for selecting
said address information stored in said address
information storing means, and address providing means
10 for providing said address information selected by said
address selecting means to a mobile terminal connected to
said subnet controlled by the apparatus itself; and
said mobile terminal acquires said address
information stored in said address information storing
15 means from said specific access router apparatus under
the condition that it is connected to said subnet of said
specific access router prior to the handover to said
adjacent subnet from said subnet.

20 8. A communication handover method in a communication
handover system, comprising a plurality of access router
apparatuses, each controlling a subnet, said method
comprising the steps of:

acquiring and maintaining an address information
25 usable in at least one adjacent subnet arranged adjacent

to said subnet controlled by the apparatus itself by one
access router apparatus among said plurality of access
router apparatuses; and

providing said address information maintained by
5 said access router apparatus where said mobile terminal
is connected when a mobile terminal connected to one
access router apparatus among said plurality of access
router apparatuses carries out handover to said adjacent
subnet from said subnet controlled by one access router
10 apparatus among said plurality of access router
apparatuses.